

1ST AND 2ND ORDERS																										2ND AND 4TH ORDERS																									
PROCESSES AND PROPERTIES INDEX																																																			
Determination of magnesium in dolomites by the method of phototurbidimetric titration. B. E. REZNIK AND G. P. FRIDOROVA <i>Zhur. Anal. Khim.</i>, 3 [2] 92-95 (1948). Dissolve 0.5 gm dolomite in a mixture of 15 to 20 ml. of HCl (1.19) and 0.5 to 1 ml. of concentrated HNO₃. Evaporate to dryness, dissolve in HCl, boil, filter, and precipitate with NH₃. Filter, boil the filtrate, and add gradually (1 drop sec.) a weakly ammoniated 10% (NH₄)₂MoO₄ solution. Boil for 15 to 20 min. until clear, filter with suction through a No. 3 or No. 4 Schott filter, wash the precipitate 6 to 8 times with hot water, and dilute the filtrate and wash waters to 250 ml. with water. To 5 to 10 ml. of the solution (depending on Mg content) add 5 ml. of NH₄OH (1.9) and half of the calculated equivalent of Na₂HPO₄ solution and measure the optical density of the solution, having previously set the galvanometer at the maximum value (100%). Then, while constantly stirring, add 0.1-ml. portions of the titrated solution and record the galvanometer reading after each 2 min. Calculate from calibration curves. The equivalent point is reached when maximum optical density is obtained. The titer of Na₂HPO₄ solution was established by volumetric method and by the method of phototurbidimetric titration with Mg solution of known concentration, determined by the pyrophosphate method. The analysis requires 60 to 70 min. Accuracy is 0.2 to 0.3%, absolute for 10 to 20% MgO. B. Z. K.																																																			
ASAC-SLA METALLURGICAL LITERATURE CLASSIFICATION																																																			

REZNIK, B. Ya. [Rieznik, B.IA], dotsent.

Vaccination of children during the recovery period of poliomyelitis using whooping cough-diphtheria vaccine. Ped., akush. i gin. 24 no.1:19-22'62. (MIRA 16:8)

1. Kafedra detskikh infektsiy (zav. - dotsent B.Ya. Reznik [Rieznik, B.IA]), Donetskogo meditsinskogo instituta (rektor dotsent A.M. Ganichkin [Hanichkin, A.M.]).

rosian, R. Ye.

Flaukhman, M. S. and Rennik, B. Ye.-"The determination of manganese by the photo-colorimetric titration method," Dokl. Akad. Nauk SSSR (Engl. transl.), Vol. XXXIII, 1944, p. 130-32.

SO: U-5240, 17, Dec. 49, (Latest Journal of the Optical Society of America, B, 25, 1949).

and 12, p. 12.

Reznik, B. Ye. and Chernova, A. I. - "The determination of iron in natural water by the photoelectric method," Report 1, Nauch. zapiski (Dnepropetr. gos. un-t), Vol. XXXIII, 1948, p. 145-55, - Bibliog: 3 items

SO: U-5740, 17, Dec. 53, (Letopis 'Zhurnal 'nykh Statey, No. 25, 1949).

RENN, A. Ye.

Reznik, B. Ye., and Chernova, A. K. - "The determination of the bivalent iron concentration in natural water," Report 2, Nauch. zapiski (Dnepropetr. gos. un-t), Vol. XXXIII, 1948, p. 157-61

SO: U-5240, 17, Dec. 53, (Leto is 'Zhurnal 'nykh Statey, No. 25, 1949).

Kukhar, V. Ye.

Rennik, B. Ye, and Fedorova, G. P. - "The determination of calcium in dolomite by the photo-nephelometric titration method," Nauch. zapiski (Dnepropetr. gos. un-t), Vol. XXXIII, 1948, p. 163-72, - Bibliog: p. 172

SO: U-5290, 17, Dec. 53, (Letopis 'Zhurnal 'nykh Statey, No. 25, 1948).

CA

7

Photocolorimetric titration in the analysis of alloy steel
M. S. Gaukhman, B. E. Reznik, and G. M. Ganzburg
Dnepropetrovsk State Univ. (U.S.S.R.). *Zashchita*
Lab. 16, 1945-8(1959). Mn and Cr are detd. on same
sample within 0.02% and 0.2%, resp. Up to 20% Ni and
9% W do not interfere; V is titrated with Cr and must be
detd. separately, also photometrically with accuracy of
0.02%. The H_2SO_4 soln. of the sample is boiled with Ag_2SO_4
and $(NH_4)_2S_2O_8$ and the resulting $KMnO_4$ is titrated photo-
metrically with arsenite until the galvanometer becomes
stationary; the Cr is then titrated with Mohr salt by using
phenylanthranilic acid indicator. V is oxidized to vanadate
by $KMnO_4$ (excess removed by oxalate) and is photometri-
cally titrated with Mohr salt by using phenylanthranilic acid
indicator. In presence of W, H_3PO_4 is added. G. M. K.

Photocolorimetric determination of benzene and toluene.
I. E. J. Berezyanskaya, B. E. Reznik, and S. S. Gitis.
Nauch. Zapiski, Leningradsk. Gosudarst. Univ. 43, 45-
52 (1954); *Referat. Zhur., Khim.* 1954, No. 27389. — Nitra-
tion of benzene with the Stepanov (Sudebnaya Khimiya
(Forensic Chemistry), Medgiz, Moskva, 1947) mixt. forms
m-dinitrobenzene which gives a color reaction with Me₂CO
and alk. solns. Under similar conditions nitration of toluene
forms trinitrotoluene which in alc.-KOH soln. gives a faint
violet color. Based on these photocolorimetric methods
small quantities of benzene and toluene can be detd. in the
air of industrial plants or products. M. Haseh

Jan

KEZNIK, B.E.

USSR.

✓ Photocolorimetric determination of cobalt as an oxalate complex. B. E. Reznik and R. E. Duzach. Nauch. Zapiski Dnepropetrovsk. Gosudarst. Univ. 43, 73-8 (1953); Referat. Zhur., Khim. 1954, No. 18603. In the oxalate complex of trivalent Co, the ratio of Co: C₂O₄ = 1:3 which was in accordance with literature data. The optimum conditions for detg. the trivalent were: for each 50 ml. of total vol. 2 ml. of AcOH, 5 ml. of 20% AcONH₄, not less than 4 and up to 10 ml. of M K₂C₂O₄, and not less than 0.5 g. PbO₂. The formation of the colored complex required 3-5 min. Heating above 40° sharply lowered the light absorption. Max. light absorption was at approx. 600 mμ. The complex was decompd. by light. Twenty times as much Fe, Ni, and Al and twice as much Cr as Co did not interfere in this detn. Cu in a ratio of Co:Cu = 1:2 and Mn⁺⁺ in a ratio of Co:Mn = 1:1 increased the absorption appreciably. Time required was 15-20 min., and at a Co content 1-2% the accuracy was 0.05-0.35 abp. %.

M. Hosh

AS RH

Rapid method for determining silica in open-hearth slag.
 B. E. Reznik, G. P. Fedorova, and G. N. Veretennikova.
~~Nezavisimyye Dnepropetrovsk. Gosudarst. Univ.~~ 43, 70-71
 (1953); Referat. Zhur., Khim. 1954, No. 16054. The pro-
 posed method is faster than the usual gravimetric method. It
 is based on the photocolometric detn. of molybdenum blue
 obtained by reduction of the yellow Si molybdate complex.
 The best solvent was found to be 3N HCl. For dissolving
 the slag, it is essential to treat it first with hot H₂O. The
 best reducing agent was found to be 4-5 ml. of 0.1N (NH₄)₂
 Fe(SO₄)₂. The light absorption of the complex is const. for
 more than 10 min. The construction of calibration curves
 from standard soln. and industrial samples of slag is outlined
 in detail. The analysis of readily and difficultly sol. slags is
 described. M. Hosh

REZNIK, B.E.

U S S R .

✓ 536. Micro-crystalloscopic determination of some rare elements. V. D. Vasilenko, B. E. Reznik and E. E. Lutsenko (*Nauchn. Zap. Dnepropetrovskogo Gos. Univ.*, 1953, 43, 105-115; *Referativnyi Zh. Khim.*, 1954, Abstr. No. 10,804).—Quinoline can be used for the detection of In, Tl and Sb; 8-hydroxyquinoline for In, Sb, Sn and Tl; and dibromohydroxyquinoline for V, W, Mo, Ti, Tl, Sb, Sn and In. The last reagent can detect the elements in 4-component mixtures. The optical properties of the crystals formed, the sensitivity limits and the best conditions for carrying out the reactions are reported. E. Hayes

REZNIK, B.E.

V. D. YH JLEIV DV

USSR:

Microcrystalloscopic detection of some metals with 8-quinolinol. V. D. Vasilenko, B. E. Reznik, and L. A. Nakonechnaya. *Trudy Khim. Nauk S.S.S.R., Otdel. Khim. Nauk* 5(8), 112-19(1954). The optical properties of their oxinates were used to detect Mo^{6+} , W^{6+} , V^{5+} , Ti^{4+} , UO_2^{2+} , Cu^{2+} , Zn^{2+} , and Al^{3+} . Mo^{6+} , W^{6+} , and V^{5+} were detected in Cu solns., Zn solns., and steel. The 8-quinolinol (I) was usually in AcOH soln. For W, 2 drops 4% I soln. is added to a drop of sample on a slide. Dark-green rectangular crystals, frequently in rosettes, related to the trigonal system are formed. By pptn. with alc. I soln. larger crystals, sometimes with forked ends, are formed. Angle of extinction is $35-40^\circ$, crystal size 0.09-0.21 mm., and n is higher than that of I. Detectable min. is 0.05 γ W^{6+} , diln. limit 1:400,000. For V, to a drop of sample is added 30% AcOH, a crystal of NaOAc, and excess 1% I soln. Bright-yellow monoclinic prisms appear but their form and color depend on the AcOH concn. By

(over)

V. B. VASILEV
 acidifying with 80% AcOH dark-yellow octahedrons, prisms,
 and rectangles are formed; with 3% AcOH, pale-yellow
 rectangles. The n is higher than that of I. The crystals
 have pleochroism from light yellow to yellow, parallel and
 inclined extinction. Angle of extinction is $21-7^\circ$. The
 sign of the zone of the crystal is neg. Crystal size is 0.30-
 0.50 mm., detectable min. 0.03 γ VV, diln. limit 1:1,000,000.
 Mo oxinate is pptd. from 80% AcOH soln. by a 4% I soln.
 as yellow-green marbullites with pleochroism from light yel-
 low to yellow-green. Detectable min. is 0.000 γ Mo^{VI}, diln.
 limit 1:300,000. TI is pptd. from mineral acid soln. by
 alc. I soln. and a crystal of NH₄SCN or KSCN. Bright-
 yellow, almost orange, cubes and trapezium form. By
 pptn. from AcOH soln. are formed lemon-yellow cubes,
 rapidly grouping into dendrites. The crystals are related to
 the cubic system and are optically isotropic. Detectable
 min. is 0.2 γ Ti^{IV}, diln. limit 1:80,000. For UO₂⁺⁺, a
 drop of sample is acidified with 3% AcOH, a drop of satd.
 NH₄OAc added, and the soln. heated to 80°. Addn. of 4%

V. P. VASILENKO

I soln. forms a yellow ppt. which, by heating, turns to red-orange prisms (with truncated tips) which form rosettes. The crystals have parallel and inclined extinction angle of extinction $23-28^\circ$, and n higher than that of I. The size of these monoclinic crystals is $0.28-0.38$ mm. Detectable min. is $0.044 \gamma \text{ UO}_2^{++}$, diln. limit $1:230,000$. Cu oxinate is pptd. in AcOH solns. buffered with NaOAc, in alk. Na tartrate soln., and in NH_4OH . Addn. of 4% I soln. ppts. dark-green to yellow needles which form rosettes. The needles have weak pleochroism, parallel extinction, and n higher than that of I. Detectable min. is $0.02 \gamma \text{ Cu}^{++}$, diln. limit $1:250,000$. For the Zn test, a drop of sample is acidified with 30% AcOH and heated to 60° . Addn. of 1% I soln. ppts. yellow-green elongated prisms. By pptn. from solns. buffered with NaOAc are formed X-crystals and dendrites. These monoclinic crystals have neg. zone index, weak pleochroism, parallel and inclined extinction, and n higher than that of I. The angle of extinction is $16-24^\circ$, crystal size $0.21-0.30$ mm., detectable min. $0.038 \gamma \text{ Zn}^{++}$, diln. limit $1:52,000$. Pptn. of Al oxinate from AcOH soln. buffered with NaOAc forms long rectangles with split ends and grouped in rosettes. Also, a crystal of tartaric acid and a drop of NH_4Cl soln. are added to a drop of test soln. The

(over)

3/4

V.D. VASILENKO
 mixt. is neutralized by NH_4OH and heated to $70-80^\circ$. A 4% I soln. and a drop of NH_4OH are added and the mixt. is heated again. Yellow-green rectangles in rosettes ppt. The monoclinic prisms have parallel and inclined extinction, angle of extinction $10-24^\circ$, and neg. zone index. Crystal size is $0.13-0.30 \text{ mm.}$, detectable min. is $0.01 \gamma \text{ Al}^{+++}$, diln. limit 1,300,000. W, V and Mo can be detected in Cu solns., acidified with 30% AcOH and buffered by a crystal of NaOAc , by addn. of 1% I soln.; in the cold, the oximates of V, Mo, and Cu are formed, and these can be differentiated by color, form, and size. On heating, W oxinate ppts. Limiting ratios are $\text{Cu:W} = 8:1$, $\text{Cu:V} = 4:1$, and $\text{Cu:Mo} = 10:1$. Similarly in Zn solns. limiting ratios are $\text{Zn:W} = 5:1$, $\text{Zn:V} = 4:1$, and $\text{Zn:Mo} = 8:1$. In Cu-Zn soln. only Cu oxinate is observed. For steel analysis several grains are dissolved in HCl (1:4), oxidized by drops of HNO_3 , dild. with H_2O , and filtered. The ppt. is washed with dil. HCl (1:10). The ppt. contains WO_3 and SiO_2 , the filtrate contains Mo, V, Fe, Cr, etc. The ppt. is heated on a slide with NaOH , neutralized, and acidified with glacial AcOH . Addn. of 4% I soln. ppts. yellow-green rectangles of W oxinate. The filtrate, after sepn. of WO_3 and SiO_2 , is heated to boiling, made alk. with 5% NaOH , and filtered. This filtrate is heated to 80° and acidified with AcOH . Addn. of 4% I soln. forms yellow rectangles and prisms of V oxinate and yellow-green marbullites of Mo oxinate.
 Burilla Mayerle

4/4

REZNIK, B.Ya.

Dynamics of antidiphtherial immunity following the inoculation with the whooping cough and diphtheria vaccine of children of various age groups. Zhur. mikrobiol., epid. i immun. 33 no.7:62-66 J1 '62. (MIRA 17:1)

1. Iz kafedry detskikh infektsiy Donetskogo meditsinskogo instituta.

REZNIK, B.Ya.

Course of diphtheria in children after an influenza epidemic in
Stalino. *Pediatrics* 38 no.6:32-34 Je '60. (MIRA 13:12)
(STALINO--DIPHTHERIA) (INFLUENZA)

ROZE, O.I.; REZNIK, B.Ya.

Characteristics of lesions of the nervous system in epidemic:
parotitis. Sov. med. 24 no. 2:32-37 F '60. (MIRA 14:2)

1. Iz kliniki detskikh infektsiy (zav. - dotsent O.I. Roze) Stalinskogo
meditsinskogo instituta (direktor - dotsent A.M. Ganichkin).
(MUMPS) (NERVOUS SYSTEM—DISEASES)

REZNIK, B.Ya., kand.med.nauk; KURAKINA, L.T.

Pontine form of poliomyelitis and isolated facial neuritis. Sov.
med. 25 no.1:87-91 Ja '61. (MIRA 14:3)

1. Iz kliniki detskikh infektsionnykh bolezney (zav. - dotsent O.I.
Roze) Stalinskogo meditsinskogo instituta (direktor - dotsent A.M.
Ganichkin) i Oblastnoy klinicheskoy bol'nitsy imeni M.I.Kalinina
(glavnyy vrach - kand. med. nauk B.A.Shaporenko).
(POLIOMYELITIS) (NEURALGIA, FACIAL)

REZNIK, B.Ya., kand.med.nauk; ZAKHAROVA, O.A.

Case of sepsis with a clinical symptom complex of the fulminating form of capillarotoxicosis. Vop.okh.mat.i det. 5 no.3:85-87
My-Je '60. (MIRA 13:7)

1. Iz kafedry patologicheskoy anatomii (zav. - dotsent Ye.A. Dikshteyn) i kafedry detskikh infektsiy (zav. - dotsent O.I. Roze) Stalinskogo meditsinskogo instituta (dir. - dotsent A.M. Ganichkin).

(PURPURA (PATHOLOGY))

REZNIK, B.Ya.

Effect of influenzal infection on the intensity of diphtherial
immunity and morbidity in children. Zhur. mikrobiol. epid. i
immun. 31 no. 5:27-28 My '60. (MIRA 13:10)

1. Iz kliniki detskikh infektsiy Stalinskogo meditsinskogo
instituta.

(DIPHTHERIA) (INFLUENZA)

5(2)

AUTHORS: Reznik, B. Ye., Blagach, R. Ye., Ponomarev, A. I.

SOV/32-24-12-4/10

TITLE: The Determination of Cobalt in Metallic Nickel
(Opredeleniye kobal'ta v metallicheskom nikel'e)

PERIODICAL: Zavodskaya Laboratoriya, 1958, Vol 24, Nr 12, pp 1431-1432 (USSR)

ABSTRACT: Nitroso R salt forms a brightly colored complex compound with cobalt ions. Since this reaction is very sensitive and specific it is widely used (Ref 1). A disadvantage of this method is that the reagent itself is strongly colored and is most conveniently used with a green filter (maximal transmittance 530 mμ) (Refs 2,3). It was observed that the transformation of cobalt into the complex compound goes to completion with a pH of 8 - 8.5. The optical measurements are nevertheless better in acid medium. Also, small changes in the pH do not cause such a wide variation in the optical density values when the reaction is carried out in base. According to the analytical procedure given the sample is dissolved in nitric acid (1 : 1), sodium acetate is added, and the nickel hydroxide is precipitated with Nitroso R salt. The nickel hydroxide is then redissolved in HNO₃ (1 : 1) and the remaining solution is investigated. The calibration curve was prepared from a nickel sample Nr 91 containing 0.78% cobalt (Table 1). The accuracy of the determination

Card 1/2

The Determination of Cobalt in Metallic Nickel

SOV/32-24-12-4/45

is $\pm 0.02\%$ absolute, as determined using a cobalt concentration of 0.2 - 1.2%. Time required for analysis: 20 - 25 minutes. The method is being used in the laboratory of the zavod im. Lenina (Works imeni Lenin). - There are 1 table and 4 Soviet references.

ASSOCIATION: Dnepropetrovskiy gosudarstvennyy universitet
(Dnepropetrovsk State University)

Card 2/2

5 (2)

AUTHORS:

Reznik, B. Ye., Dlugach, R. Ye.,
Sherstyak, D. N.

SOV/157-2-5-6/31

TITLE:

The Kinetics of the Formation Reaction of the Rhodanide
Complex of Molybdenum in the Presence of Copper Ions

PERIODICAL:

Izvestiya vysshikh uchebnykh zavedeniy. Khimiya i khimicheskaya
tekhnologiya, 1959, Vol 2, Nr 5, pp 674-678 (USSR)

ABSTRACT:

The determination method of molybdenum (VI) can be completed by the introduction of copper ions (II), since the otherwise very slow reaction of the molybdenum by thio-urea in the presence of rhodanide (reaction 1) is accelerated by copper (Ref 1). The authors studied the kinetics of the reaction (1) in the presence of copper sulfate to use it in the determination of small quantities of copper. The reaction rate was recorded on the basis of the temporal variation in optical density of the solutions of the rhodanide-molybdenum complex. Diagrams of the results were drawn (Fig 1). The tangent of the angle of inclination between the straight line obtained and the abscissa axis shows the reaction rate. Figures 2 and 3 show the dependence of the mentioned tangent on the concentration of the copper and molybdenum ions. The dependence of the

Card 1/3

The Kinetics of the Formation Reaction of the
Rhodanide Complex of Molybdenum in the Presence of Copper Ions

SOV/153-2-5-6/31

reaction rate on the concentration of the thio-urea is also linear. This shows that the concentration of these substances follows a kinetic equation of 1st order (Ref 2). By comparison of the calculated rate constant k and the catalytic reaction coefficient α , a considerable catalytic action of the copper ions on the reaction (1) is shown. The authors determined the catalytically detectable minimum copper quantity to be

$1.8 \cdot 10^{-6}$ mol/l. Figure 2 shows that the reaction rate of the copper concentration is proportional. The authors determined the copper concentration of the solution by using the gaging curve (Fig 2). Table 1 lists the results. To clarify the possibility of copper determination in aluminum alloys, the influence of foreign ions was studied. Table 2 shows that the ions Al^{3+} , Mn^{2+} , Zn^{2+} , Cd^{2+} , Ti^{3+} and SiO_3^{2-} increase the optical density of the solution to a certain extent, but do not change the reaction rate. Table 3 shows the results of the determination of copper on the background of large aluminum quantities. Figure 4 shows that also the iron ion (III) increases the optical density of

Card 2/3

The Kinetics of the Formation Reaction of the
Rhodanide Complex of Molybdenum in the Presence of Copper Ions

SOV/153-2-5-6/31

the solution (Fig 6). Figure 5 confirms the slow reduction of the iron ions (III) by thio-urea. Therefore the optical density is, in the presence of iron, the sum of the colorings of the disturbing iron-rhodanide- and the molybdenum-rhodanide-complex. There are 6 figures, 3 tables, and 4 Soviet references. ✓

ASSOCIATION: Dnepropetrovskiy gosudarstvennyy universitet; Kafedra
analiticheskoy khimii (Dnepropetrovsk State University,
Chair of Analytical Chemistry)

SUBMITTED: May 24, 1958

Card 3/3

SOV/78 4-4-22/44

5(4)

AUTHORS:

Reznik, B. Ye., Gansburg, G. M.

TITLE:

Investigation of the Formation Reaction of Phosphomolybdenum-blue in Solution (Issledovaniye reaktsii obrazovaniya fosfomolibdenovoy sini v rastvore)

PERIODICAL:

Zhurnal neorganicheskoy khimii, 1959, Vol 4, Nr 4, pp 845-851 (USSR)

ABSTRACT:

Physico-chemical analysis was used to investigate the conditions for the formation of phosphomolybdenum-blue (by the reduction of phosphomolybdates with iron (II) sulfate) in regard to dependence upon the acidity, the concentration of phosphate and molybdate, and the molar ratio $\frac{Mo}{P}$. The acidity was varied

between pH 0.85 and 4.1. The investigations showed that in the formation of phosphomolybdenum-blue a change in the pH value influences the degree of polymerization of the molybdate ion and the oxidation power of the phosphomolybdate ion. The sensitivity of the reaction to phosphorus at different acidities was investigated, and it was found that the reaction is most sensitive at pH 2.18 to 2.8. It was also found that

Card 1/3

SOV/78-4-4-22/44

Investigation of the Formation Reaction of Phosphomolybdenum-blue in Solution

with a molar ratio $\frac{Mo}{P} < 12$ the equilibrium between the molybdates of various degrees of saturation is of determining importance. With a molar ratio $\frac{Mo}{P} > 12$ the equilibrium between phosphomolybdenum-blue and the ions of the phosphomolybdic and molybdic acids is determining. The saturated phosphomolybdates differ from the unsaturated in their oxidizing power against iron (II). The unsaturated phosphomolybdates are not reduced by divalent iron. It was found that with molar ratios $\frac{Mo}{P} < 12$ the optical density of the phosphomolybdenum-blue is proportional to the molybdenum concentration. On the basis of this finding a new method of determining the molybdenum concentration was suggested with which a determination can be carried out in 20 minutes. The molar absorption coefficients of phosphomolybdenum-blue were calculated at various pH values and they are given in a table. A table gives the relationship between the optical density of molybdenum-blue and phosphomolybdenum-blue. A third table gives the results of the analysis of 6 ferromolybdenum samples using the method developed. There

Card 2/3

SOV/78-4-4-22/44

Investigation of the Formation Reaction of Phosphomolybdenum-blue in Solution.

are 11 figures, 3 tables, and 17 references, 14 of which are Soviet.

SUBMITTED: December 30, 1957

Card 3/3

NOVAK, V.P.; REZNIK, B.Ye.; MAL'TSEV, V.F.

Amperometric titration of fluorine ions with zirconium salts.
Zhur. anal. khim. 20 no.8:827-830 '65. (MIRA 18:10)

1. Ukrainskiy nauchno-issledovatel'skiy trubnyy institut,
Dnepropetrovsk.

REZNIK, B.Ye.; TSYGANOK, L.P.

Photometric study of phosphomolybdic and molybdic acids
in solution. Zhur.neorg.khim. 10 no.8:1914-1917 Ag '65.
(MIRA 19:1)

1. Submitted November 10, 1964.

REZNIK, B.Ye.; TSYGANOK, L.P.

Reduction reaction of phosphomolybdic acid by thiourea in the presence of copper ions. Izv. vys. ucheb. zav.; khim. i khim. tekhn. 8 no.3:392-396 '65. (MIRA 18:10)

L. Dnepropetrovskiy gosudarstvennyy universitet, kafedra analiticheskoy khimii.

1.2.3.4.5.6.7.8.9.10.11.12.13.14.15.16.17.18.19.20.21.22.23.24.25.26.27.28.29.30.31.32.33.34.35.36.37.38.39.40.41.42.43.44.45.46.47.48.49.50.51.52.53.54.55.56.57.58.59.60.61.62.63.64.65.66.67.68.69.70.71.72.73.74.75.76.77.78.79.80.81.82.83.84.85.86.87.88.89.90.91.92.93.94.95.96.97.98.99.100.101.102.103.104.105.106.107.108.109.110.111.112.113.114.115.116.117.118.119.120.121.122.123.124.125.126.127.128.129.130.131.132.133.134.135.136.137.138.139.140.141.142.143.144.145.146.147.148.149.150.151.152.153.154.155.156.157.158.159.160.161.162.163.164.165.166.167.168.169.170.171.172.173.174.175.176.177.178.179.180.181.182.183.184.185.186.187.188.189.190.191.192.193.194.195.196.197.198.199.200.201.202.203.204.205.206.207.208.209.210.211.212.213.214.215.216.217.218.219.220.221.222.223.224.225.226.227.228.229.230.231.232.233.234.235.236.237.238.239.240.241.242.243.244.245.246.247.248.249.250.251.252.253.254.255.256.257.258.259.260.261.262.263.264.265.266.267.268.269.270.271.272.273.274.275.276.277.278.279.280.281.282.283.284.285.286.287.288.289.290.291.292.293.294.295.296.297.298.299.300.301.302.303.304.305.306.307.308.309.310.311.312.313.314.315.316.317.318.319.320.321.322.323.324.325.326.327.328.329.330.331.332.333.334.335.336.337.338.339.340.341.342.343.344.345.346.347.348.349.350.351.352.353.354.355.356.357.358.359.360.361.362.363.364.365.366.367.368.369.370.371.372.373.374.375.376.377.378.379.380.381.382.383.384.385.386.387.388.389.390.391.392.393.394.395.396.397.398.399.400.401.402.403.404.405.406.407.408.409.410.411.412.413.414.415.416.417.418.419.420.421.422.423.424.425.426.427.428.429.430.431.432.433.434.435.436.437.438.439.440.441.442.443.444.445.446.447.448.449.450.451.452.453.454.455.456.457.458.459.460.461.462.463.464.465.466.467.468.469.470.471.472.473.474.475.476.477.478.479.480.481.482.483.484.485.486.487.488.489.490.491.492.493.494.495.496.497.498.499.500.501.502.503.504.505.506.507.508.509.510.511.512.513.514.515.516.517.518.519.520.521.522.523.524.525.526.527.528.529.530.531.532.533.534.535.536.537.538.539.540.541.542.543.544.545.546.547.548.549.550.551.552.553.554.555.556.557.558.559.560.561.562.563.564.565.566.567.568.569.570.571.572.573.574.575.576.577.578.579.580.581.582.583.584.585.586.587.588.589.590.591.592.593.594.595.596.597.598.599.600.601.602.603.604.605.606.607.608.609.610.611.612.613.614.615.616.617.618.619.620.621.622.623.624.625.626.627.628.629.630.631.632.633.634.635.636.637.638.639.640.641.642.643.644.645.646.647.648.649.650.651.652.653.654.655.656.657.658.659.660.661.662.663.664.665.666.667.668.669.670.671.672.673.674.675.676.677.678.679.680.681.682.683.684.685.686.687.688.689.690.691.692.693.694.695.696.697.698.699.700.701.702.703.704.705.706.707.708.709.710.711.712.713.714.715.716.717.718.719.720.721.722.723.724.725.726.727.728.729.730.731.732.733.734.735.736.737.738.739.740.741.742.743.744.745.746.747.748.749.750.751.752.753.754.755.756.757.758.759.760.761.762.763.764.765.766.767.768.769.770.771.772.773.774.775.776.777.778.779.780.781.782.783.784.785.786.787.788.789.790.791.792.793.794.795.796.797.798.799.800.801.802.803.804.805.806.807.808.809.810.811.812.813.814.815.816.817.818.819.820.821.822.823.824.825.826.827.828.829.830.831.832.833.834.835.836.837.838.839.840.841.842.843.844.845.846.847.848.849.850.851.852.853.854.855.856.857.858.859.860.861.862.863.864.865.866.867.868.869.870.871.872.873.874.875.876.877.878.879.880.881.882.883.884.885.886.887.888.889.890.891.892.893.894.895.896.897.898.899.900.901.902.903.904.905.906.907.908.909.910.911.912.913.914.915.916.917.918.919.920.921.922.923.924.925.926.927.928.929.930.931.932.933.934.935.936.937.938.939.940.941.942.943.944.945.946.947.948.949.950.951.952.953.954.955.956.957.958.959.960.961.962.963.964.965.966.967.968.969.970.971.972.973.974.975.976.977.978.979.980.981.982.983.984.985.986.987.988.989.990.991.992.993.994.995.996.997.998.999.1000.1001.1002.1003.1004.1005.1006.1007.1008.1009.1010.1011.1012.1013.1014.1015.1016.1017.1018.1019.1020.1021.1022.1023.1024.1025.1026.1027.1028.1029.1030.1031.1032.1033.1034.1035.1036.1037.1038.1039.1040.1

1. Mixing ferric oxide with a 10% iron content. Khim. prom.
 1961 No. 2, p. 144. (MIRA 13:7)

REZNIA, B. Ia.

Comparative characteristics of pertussis-diphtheria, pertussis-diphtheria-tetanus and sorbed pertussis-diphtheria-tetanus vaccines in the immunization of children. Zhen. mikrobiol., epid. i immun. 40 no.12:13-17 D '63. (MIRA 17:12)

1. Iz Donetskogo meditsinskogo instituta.

ACCESSION NR: AP4040544

S/0064/64/000/006/0440/0442

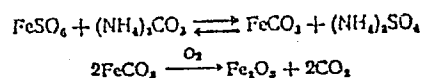
AUTHOR: Grechanovskiy, V. F.; Reznik, B. Ye.; Skarre, O. K.; Dlugach, R. Ye.; Gubenko, R. V.

TITLE: Production of ferric oxide with low iron content

SOURCE: Khimicheskaya promy'shlennost', no. 6, 1964, 440-442

TOPIC TAGS: ferric oxide, production, purification, analytical grade ferric oxide, ferrite production, electrical industry, ferric carbonate

ABSTRACT: A procedure was worked out for the production of analytical grade ferric oxide which comprises an improvement on the iron carbonate precipitation and calcining method:



In the improved method the second wash after calcining is eliminated and the amount

Card 1/2

ACCESSION NR: AP4040544

of distilled water required in the first wash is reduced. The conditions found most amenable to the production of an FeCO_3 precipitate with a reduced amount of impurities which are fairly readily washed out include: pouring a 40% solution of $\text{FeSO}_4 \cdot 7\text{H}_2\text{O}$ (preheated to 60-65C) into a strongly agitated 25% $(\text{NH}_4)_2\text{CO}_3$ solution preheated to 35-40C and taken in two-fold excess (not in stoichiometric amounts). Mixing is to be continued for 30-60 minutes and the mixture then allowed to stand one hour. The precipitate is washed with hot water on the filter, dried and calcined. Subsequent washing is not required. Analysis of the ferric oxide thus produced showed sulfate content in the 0.01-0.08% range and alkali and alkaline earth content of 0.02-less than 0.05%. Such material may be used in ferrite production, in the electrical and radio technology. Orig. art. has: 1 equation and 4 tables.

ASSOCIATION: None

SUBMITTED: 00

ENCL: 00

SUB CODE: IC

NO REF SOV: 003

OTHER: 000

Card 2/2

REZNIK, B.Ye.; TSYGANOK, L.P.

Properties of heteropoly blue obtained in the reduction of
phosphomolybdic acid with thiourea. Zhur. anal. khim. 19 no.5:
574-587 '64. (MIRA 17:8)

1. Dnepropetrovskiy gosudarstvennyy universitet.

REZNIK, B.Ye.; SKARRE, O.K.; GRECHANOVSKIY, V.F.; DLUGACH, R.Ye.;
Prinimali uchastiye: NEDOSHOPA, G.N.; SEREBRO, V.D.;
OVDIYENKO, A.N.; GUBENKO, R.V.

Phototurbidimetric and radiometric methods for the determination of sulfates in pure iron oxide. Khim. prom. no.5:381-384 My '63. (MIRA 16:8)

1. Dnepropetrovskiy gosudarstvennyy universitet (for Reznik, Skarre, Grechanovskiy, Dlugach).

REZNIK, B.Ye.; GANZBURG, G.M.

Photometric investigation of the formation of molybdenum-
rhodanide without the introduction of a reducing agent.
Ukr. khim. zhur. 28 no.1:118-117 '61. (MIRA 16:8)

1. Dnepropetrovskiy gosudarstvennyy universitet.

REZNIK, B.Ye., BEDNYAK, N.A.; PCHELKINA, M.V.

Kinetics of the reduction of the thiocyanato complex of iron in the presence of copper ions. Izv.vys.sheb.zav.;khim. i khim.tekh. 6 no.2:209-211 '63. (MIRA 16:9)

1. Dnepropetrovskiy gosudarstvennyy universitet, kafedra analiticheskoy khimii.
(Iron compounds) (Thiocyanates) (Copper catalysts)

REZENIN, B. Ye., GANZBURG, G. M., and BEDNYAK, N. A.

"Investigation of the Catalytic Action of Several Transition Elements
on the Reduction of Molybdenum by Thiocyanide Zrodanid"

submitted at the Conference on Kinetic Methods of Analysis, Ivanovo,
14-16 June 1960

So: Izvestiya Vysshikh Uchebnykh Zavedeniy SSSR, Khimiya i Khimicheskaya
Technologiya, Vol III, No 6 Ivanovo, 1960, pages 1113-1116.

REZNIK, B.Ye., kand.med.nauk; APANOVICH, L.M.; TETERYATNIK, Ye.A.

Clinical characteristics of central nervous system lesions in
influenza in children. *Pediatrics* 39 no.4:41-48 Apr '61.
(MIRA 14:4)

1. Iz kafedry detskikh infektsii (zav. - dotsent O.I. Roze)
Stalinskogo meditsinskogo instituta (dir. - dotsent A.M.
Ganichkin) i oblastnoy klinicheskoy bol'nitsy imeni M.I.
Kalinina (glavnyy vrach - kand.med.nauk B.A. Shaporenko).
(INFLUENZA) (NERVOUS SYSTEM--DISEASES)

REZNIK, B.Ye.; GANZBURG, G.M.; SACHKO, V.V.

Rapid variant of the rhodanide method for the determination of
molybdenum. Zav.lab. 28 no.3:277-278 '62. (MIRA 15:4)

1. Dnepropetrovskiy gosudarstvennyy universitet.
(Molybdenum—Analysis) (Thiocyanates)

REZNIK, B.Ye. [Reznik, B.IE.]; BEDNYAK, N.A.

Investigating the catalytic effect of copper on the reduction of
molybdenum by rhodanide. Dop. AN URSR no.2:216-218 '62.(MIRA 15:2)

1. Dnepropetrovskiy gosudarstvennyy universitet. Predstavleno
akademikom AN USSR A.K.Babko.
(Copper--Analysis)(Catalysis)(Molybdenum thiocyanate)

REZNIK, B.Ya.,; BRYUM, R.M.; STARODUB, N.S.; MANOLOVA, E.P.; IVANOVA, S.S.

Schick's reaction in Stalino children vaccinated against diphtheria;
author's abstract. Zhur.mikrobiol.epid.i immun. 31 no.8:142 Ag
'60. (MIRA 14:6)

1. Iz Stalinskogo meditsinskogo instituta.
(STALINO--DIPHTHERIA)

REZNIK, B.Ya. [Rieznik, B.IA.], kand.med.nauk; ZHIVOTOVSKAYA, S.Ya.
[Zhyvotovs'ka, S.Ia.]; APANOVICH, L.M.

Clinical characteristics of influenza in children. Ped., akush.
i gin. 22 no.4:5-8 '60. (MIRA 14:5)

1. Klinika detskikh infektsionnykh bolezney (ispolnyayushchiy
obyazannosti zaveduyushchego kafedroy - B.Ya.Reznik) Stalinskogo
meditsinskogo instituta (direktor - dotsent A.M.Ganichkin [Hanichkin,
A.M.]) na baze Stalinskoy oblastnoy klinicheskoy bol'nitsy im. M.I.
Kalinina (glavnyy vrach - B.O.Shaparenko).
(INFLUENZA)

REZNIK, B.Ye.; DLUGACH, R.Ye.; SHERSTYAK, D.N.

Kinetics of the formation of a thiocyanate complex of molybdenum
in the presence of copper ions. Izv.vys.ucheno.zhiv.; khim.i khim.
tekh. 2 no.5:674-678 '59. (MIRA 13'8)

1. Dnepropetrovskiy gosudarstvennyy universitet, kafedra
analiticheskoy khimii.
(Molybdenum compounds)

REZNIK, B. E.

Microcrystaloscopic determination of some rare elements.
V. D. Vasilenko, B. E. Reznik, and E. E. Lutsenko. *Nauch.
Zapiski Dnepropetrovsk. Gosudarst. Univ.* 43, 105-15 (1953).
Referat: *Zhur., Khim.* 1954, No. 10804. As reagents in this
detn. are used quinoline (I), o-hydroxyquinoline (II), and
dibromohydroxyquinoline (III) which form complex compds.
with the salts of many elements. The optimum conditions
for these reactions are outlined; the detectable min., limit-
ing diln., the optical properties, and the cryst. system are
described. I is advantageously used for detection of In,
Tl, and Sb, II for In, Sb, Sn, and Tl, and III for V, W, Mo,
Ti, Tl, Sb, Sn, and In. The sensitivity of the reaction
increases from I to III. The reactions of the elements with
III are specific, so that they can be detd. alone or in mixts.
M. Hosh

3

11

Sam

KAZARYAN, A., general-mayor zapasa; REZHNIK, D., polkovnik; KHORENKOV, A., polkovnik; BELAUSOV, P., podpolkovnik; PARAMONOV, V., podpolkovnik; ODEGOV, A., kapitan

Tactics of small units in modern combat; discussion of the article in no. 2. Voen.vest. 43 no.7:50-53 J1 '63. (MIRA 16:11)

KAZARYAN, A., general-mayor zapasa; REZNIK, D., polkovnik

Battalion defends the coast line. Voen. vest. 41 no.7:17-19 J1
'61. (MIRA 15:1)

(Attack and defense (Military science))

GRIGOROVICH, Ye. V.; REZNIK, D. B. (Vinnitsa)

Blood transfusion in the compound treatment of tuberculosis of
the lungs. Probl. tub. no.3:114-115 '62. (MIRA 15:4)

(TUBERCULOSIS) (BLOOD--TRANSFUSION)

GRIGOROVICH, Ye.V.; REZNIK, D.B.; CHATSKIY, Ya.A.

Case of pulmonary hemorrhage connected with the presence of a
foreign body in the bronchi. Probl.tub. 38 no.7:98 '60.

(MIRA 14:1)

(BRONCHI--FOREIGN BODIES) (LUNGS--BLOOD SUPPLY)

REZNIK, E.R., inzh.; GAL'BURT, Ye.I., inzh.

Laying a gas pipeline in tunnels. Stroi. truboprov. 8 no.3:13-14
Mr '63. (MIRA 16:5)

1. Ukrainskiy gosudarstvennyy institut po proyektirovaniyu
predpriyatiy po dobyche prirodnkh gazov, Kiyev.
(Gas, Natural--Pipelines)

MEHINOV, G. I., ENINIK, E. V., inzh., STRELEKOVSKIY, S. A., kand. tekhn. nauk

Program for determining the power of a compensating device.
Energetika 13 no.10:20-23 O '65.

(MIRA 18-10)

REZNIK, E.V.

Minimal power value of a low-voltage condenser battery.
Prom. energ. 21 no. 1:60 Ja '66 (MIRA 19:1)

1. Leningradskiy nauchno-issledovatel'skiy institut mekhanizatsii i elektrifikatsii sel'skogo khozyaystva.

REZNIK, E.Ye.

Some aspects of the construction of the SMV-2 magnetic variometric
station. Geofiz. prib. no.15:13-26 '63. (MIRA 17:4)

ACC NR: AR1000852

SOURCE CODE: UR/0058/66/000/009/E007/E007

AUTHOR: Reznik, F. Ya.

TITLE: Role of osmotic pressure in changing the surface properties of solutions with concentration

SOURCE: Ref. zh. Fizika, Abs. 9E53

REF SOURCE: Sb. Poverkhnostn. yavleniya v rasplavakh i voznikayushchikh iz nikh tverd. fazakh. Nal'chik, 1965, 112-118

TOPIC TAGS: osmotic pressure, surface tension, liquid solution, surface layer, solution property

ABSTRACT: A quantitative description of the surface phenomena arising at the interface saturated vapor liquid solution has been attempted on the basis of the theory of solutions. Osmotic pressure is used as the basic characteristic. The cycle is analyzed to derive an equation which relates the change of surface tension with the difference in osmotic pressure in surface and volume stages. As a result,

Card 1/2

ACC NR: AR7000852

a correlation between concentration of dissolved substance in the volume and in surface layer is obtained. This correlation is compared with Gibbs absorption equation for the case of a two-component solution; phenomena linked with the formation of insoluble films on the liquid surface are analyzed. The procedure for calculating isotherms of the surface tension and absorption, as well as the thickness of the surface layer is also described. N. Pokrovskiy. [Translation of abstract]
[NT]

SUB CODE: 20/

Card 2/2

REZNIK, F.Ya.

Relation between the structure of the surface layer of a pure liquid and its surface and volume properties. Dokl. AN SSSR 148 no.5:1129-1132 F '63. (MIRA 16:3)

1. Nauchno-issledovatel'skiy institut osnovnoy khimii. Predstavleno akademikom P.A.Rebinderom.
(Liquids) (Surface chemistry)

STAVISKIY, N., irzh. po ratsionalizatsii i izobretatel'stvu;
KOLODIN, I., inzh.; REZNIK, F., inzh.

Suggestions of innovators. Grazhd. av. 18 no.6:20-21 Je '61.
(MIRA 14:7)
(Technological innovations)

REZNIK, F., inzh.-tekhnolog

Made of Capron. Grazhd.av 17 no.3:17 Mr '60.
(MIRA 13:6)

(Nylon)

S/084/60/000/03/028/083
D047/D002

AUTHOR: Reznik, F., Engineer-Technologist

TITLE: Made of Caprone

PERIODICAL: Grazhdanskaya aviatsiya, 1960, Nr 3, p 17 (USSR)

ABSTRACT: This is a description of various spare parts made of caprone at the repair undertaking supervised by Comrade Ferenets. The advantages of caprone are that it is resistant to wear, strong, stable in aggressive chemical atmospheres and noiseless in operation. It consists basically of oil products. Among the parts made of it are the PNI-612421 flywheel, AOS-81 joint cap, II-884 flywheel, M18 x 1 threaded end cap, 7204-41 protector clamp, I71000-41 shoe, 7101-11 antenna insulator and I55048-0 handle. A very simple injector press for making these and other parts is described. The design of an especially productive caprone autoclave in which the casting process will be carried out under nitrogen pressure is being prepared. Other GVF repair shops will also use caprone. There

Card 1/2

Made of Caprone

S/084/60/000/03/028/083
D047/D002

are 2 photographs and 1 diagram.

Card 2/2

KRASNOYARSKIY, V.V.; REZNIK, F.M.; TAIROVA, A.L., red. izd-va; CHERNOVA,
Z.I., tekhn. red.

[Corrosion and the protection of materials; bibliography of Russian publications for the period 1917-1959] Korroziia i zashchita materialov; bibliografiia otechestvennoi literatury za period s 1917 po 1959 gody. Moskva, Gos. nauchno-tekhn. izd-vo mashinostroit. lit-ry, 1961. 274 p. (MIRA 14:10)
(Bibliography--Corrosion and anticorrosives)

KROPOTOV, V.I., inzh.; REZNIK, G.B.

Manufacture of shaped plastic rims for furniture. Der. prom.
10 no.7:27-29 J1 '61. (MIRA 14:7)

1. TSentral'noye proyektno-konstruktorskoye byuro Upravleniya
mebel'noy promyshlennosti Mosgorsovnarkhoza.
(Furniture industry) (Plastics)

REZNIK, G.B., inzh.

Using rubber strips for manufacturing the elastic bases of
upholstered furniture. Der.prom. 9 no.2:19-20 F '60.
(MIRA 13:6)

1. TSentral'noye proyektno-konstruktorskoye byuro mebel'noy
promyshlennosti Mosgorsovnarkhoza.
(Furniture)

REZNIK, G.K., kand. biolog. nauk

Comparative histological and histochemical study of the intestine in sexually mature *Fasciola hepatica* L., 1758, and *Disporocaulium lanceatum* Stiles et Hassall, 1896. Trudy VIGIS 10:238-244 '63.

Normal histology and histochemistry of the excretory system of sexually mature forms of *Fasciola hepatica* L., 1758. Ibid.:245-250 '63. (MIRA 17:9)

REZNIK, G.V., inzh.

Mechanization of labor consuming processes in the lining of
boilers. Energetik 10 no.10:28-30 0 '62. (MIRA 15:12)
(Boilers)
(Refractory concrete)

REZNIK, G.V., inzh.

Lathe for machining holes in coupling flanges of turbogenerators.
Energetik 8 no.2:9-10 F '60. (MIRA 13:6)
(Turbogenerators)
(Drilling and boring machinery)

REZNIK, I., inzh.; KSHEMINSKIY, A., inzh.

Ufa Office for Dispatching and Transportation in Containers and the Ufa Automotive Transportation Unit have been consolidated in a single automotive combine. Avt. transp. 42 no.11:8-10 N '64. (MIRA 17:12)

1. Ministerstvo avtotransporta i shosseynykh dorog RSFSR.

L 14567-66 EWT(d)/EWT(m)/FA/FA(b)/EWP(h)

ACC NR: AP6003290

SOURCE CODE: UR/0209/66/000/001/0040/0044

AUTHOR: Reznik, I. (Colonel; Candidate of military sciences)

ORG: none

TITLE: A fighter plane withdraws from attack

SOURCE: Aviatsiya i kosmonavtika, no. 1, 1966, 40-44

TOPIC TAGS: fighter aircraft, attack fighter aircraft, trajectory measurement, motion parameter

ABSTRACT: The safety of a fighter aircraft depends on how close it approaches the target before withdrawing from attack. There is a minimum distance between aircraft and target for which the danger of collision or defensive fire is practically nonexistent. This distance can be determined from an analysis of the motion trajectory of the fighter relative to the target at the time of its withdrawal from the attack. Mathematical relationships between the parameters of motion for aircraft and target are presented in Fig. 1. Assuming that the fighter withdraws from attack by making an accurate turn with radius R , the fighter will, at time t , be located at point A_1 , and the target at point B_1 . The position of the fighter relative to

Card 1/3

L 14567-66

ACC NR: AP6003290

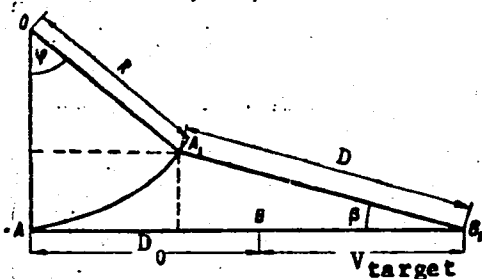


Fig. 1. Motion parameters of a fighter and target.

target at that time can be ascertained from the distance $D = A_1B_1$, and the angle β as follows:

$$D = \sqrt{(R - R \cos \varphi)^2 + (D_0 + V_{\text{tar}} t - R \sin \varphi)^2}; \quad \beta = \arctg \frac{R - R \cos \varphi}{D_0 + V_{\text{tar}} t - R \sin \varphi}.$$

The radius of turn of a fighter flying at velocity V_f and bank γ will equal

$$\frac{V_f^2}{g \tan \gamma}.$$

Card 2/3

L 14567-66

ACC NR: AP6003290

and the angle of turn relative to the initial direction at time t will be

$$\varphi = \frac{g \sin \theta}{V} \cdot t.$$

Orig. art. has: 6 figures.

[VM]

SUB CODE: 01/ SUBM DATE: none/ ATD PRESS: 4190
19/

CC
Card 3/3

REZNIK, I.D.; KRUGLYAKOVA, M.S.

Laboratory investigation of gypsum behavior in the presence
of slag as used in the shaft furnace smelting of oxidized
nickel ores. Sbor. nauch. trud. Gintsvetmeta no.18:275-
299 '61 (MIRA 16:7)

(Nickel--Metallurgy) (Gypsum)

REZNIK, I.D.; KRUGLYAKOVA, M.S.

Sulfuration of iron silicates and magnetite by sulfur vapor
and sulfur dioxide. Sbor. nauch. trud. Gintsvetmeta no.18:
300-306 '61. (MIRA 16:7)

(Sulfuration)
(Nickel industry—By-products)

REZNIK, I.D.

Phenomenon of the afterblow in shaft furnace smelting of oxidized
nickel ores and lead sinter. TSvet, met. 34 no.2:30-38 F '61.
(MIRA 14:6)

(Nickel--Metallurgy) (Lead--Metallurgy)

REZNIK, I.D.; KRUGLYAKOVA, M.S.

Mechanism of sulfuration in the shaft smelting of oxidized
nickel ores with calcium sulfate. Zhur. prikl. khim. 33
no.11:2449-2458 N '60. (MIRA 14:4)
(Sulfuration) (Nickel—Metallurgy)

OSHE, A.I.; ASTAKHOV, I.I.; NIKITINA, Z.Ya.; REZNIK, I.F.; BAGOTSKIY, V.S.

Change of the structure of a negative electrode in a silver-zinc
storage cell in operation. Zhur.prikl.khim. 34 no.10:2254-2260
0 '61. (MIRA 14:11)

1. Institut elektrokhemii AN SSSR i Vsesoyuznyy nauchno-issledovatel'skiy
institut istochnikov toka.

(Electrodes)

CHIRKIN, A.P., doktor tekhn. nauk, prof.; REZNIK, I.I., inzh.;
CHAROM'SKIY, A.D., doktor tekhn. nauk, prof., retsenzent;
VASIL'YEVA, N.G., inzh., red.; UVAROVA, A.F., tekhn.red.

[Diesel-engine fuel systems] Dizel'naia toplivnaia ap-
paratura; spravochnik. Moskva, Mashgiz, 1963. 169 p.
(MIRA 16:11)

(Diesel engines--Fuel systems)

REZNIK, I.S., kand. tekhn. nauk

Means of documentation and copying and duplicating equipment in
the countries of the Mutual Economic Assistance Council. Ma-
shinstroitel' no. 1:7-12 Ja '66 (MIRA 19:1)

REZNIK, I.S.

Urgent problems in the mechanization of engineering and management work. Mashinostroitel' no.1:1-4 Ja '65.

(MIRA 18:3)

REZNIK, Iosif Semenovich; KRINSKIY, A.I., red.; FREGER, D.P.,
red. izd-va; BELOGUROVA, I.A., tekhn. red.

[Present state, efficiency, and outlook for the mechanization of design and construction work] Sostoianie, effektivnost' i perspektivy mekhanizatsii proektno-konstruktorskikh rabot; stenogramma doklada na Vserossiiskom soveshchanii po mekhanizatsii inzhenernogo i upravlencheskogo truda v promyshlennosti i stroitel'stve. Leningrad, 1963. 22 p.

(MIRA 16:11)

(Construction industry--Management)

REZNIK, I.Ye.

Instruments for taking prints from the mucous membrane of the nose and the nasopharynx. Zhur. ush., nos. i gorl. bol. 23 no.3:91-92
My-Je '63. (MIRA 16:7)

1. Iz otdeleniya bolezney ukha, gorla i nosa 6-y gorodskoy bol'-
nitzy Luganska.

(NOSE) (NASOPHARUNX)
(SURGICAL INSTRUMENTS AND APPARATUS)

REZNIK, K.A.

Determination of a common error of radio measuring devices.
Radiotekhnika 20 no.2:69-74 F '65. (MIRA 18:4)

REZNIK, K.A.

Concerning the measurement of the percentage of modulation at
small signal levels. Radiotekhnika 16 no.5:71-75 My '61. (MIRA 14:6)
(Modulation (Electronics)—Measurement)

KORSUNSKIY, M. I.; REZNIK, M. B.; TRUTEN', R. M.

A possible method for measuring the concentration of ions
generated by hydroionizers. Izv. vys. ucheb. zav.; fiz. no. 6:
152-156 '62. (MIRA 16:1)

1. Khar'kovskiy politekhnicheskoy institut imeni Lenina.

(Electrometer) (Ionization---Measurement)

82336

S/139/60/000/03/018/045

EQ32/E514

24.7700
24.7500
AUTHORS: Reznik, M.V. and Korsunskiy, M.I.

TITLE: On the Diffusion of Mercury Atoms Into Selenium ↑

PERIODICAL: Izvestiya vysshikh uchebnykh zavedeniy, Fizika,
1960, Nr 3, pp 107 - 111 (USSR)

ABSTRACT: The effect of mercury impurities on the conductivity of selenium is well known (Refs 1, 2, 4). The mercury impurity increases the conductivity of selenium by millions of times and alters its photo-conductivity. It has been found experimentally that the change in the photo-conductivity of selenium depends on its electrical conductivity and consequently on the amount of impurities introduced into the selenium. Depending on the concentration of the mercury-impurity atoms, the photo-conductivity of selenium can be either positive or negative. Hence, in order to obtain a definite concentration of mercury atoms in selenium and consequently a given type of conductivity, it is important to have information about the diffusion of mercury into selenium. Published data on this subject are claimed to be not very consistent. The present paper reports results of

Card1/4

4

82336

S/139/60/000/03/018/045

EQ52/E314
Selenium

On the Diffusion of Mercury Atoms Into

measurements of the rate of diffusion of mercury into thin (10^{-4} cm) films of amorphous and crystalline selenium. The selenium was deposited onto circular glass plates, 16 mm in dia, or rectangular glass plates, 14 x 26 mm, with grooves cut into them. Wire electrodes, 0.45 mm in dia, were fixed in these grooves and were covered with a layer of gold or silver. The selenium was then deposited on these discs and placed in a vacuum.

The thickness of the selenium deposit was 10^{-4} - 10^{-5} cm. The form of the discs and plates is illustrated in Figures 1 and 2. Depending on the temperature of the base, the selenium was in an amorphous or crystalline state. The structure of the deposits was investigated by X-ray methods and also metallographically. The mercury atoms were introduced into the selenium with the aid of the apparatus illustrated in Figure 3. This simply consists of a perspex holder B into which the specimen 4 could be inserted and subjected to the effect of mercury vapour, the mercury being held in the adjustable reservoir A.

Card2/4

4

82336

S/139/60/000/03/018/045

~~E032/E314~~

On the Diffusion of Mercury Atoms Into Selenium

While the selenium was in the mercury-vapour atmosphere, its electrical conductivity was continuously measured. Mercury atoms entering the selenium increase conductivity. After a certain time τ after the beginning of the penetration of mercury into the selenium, a measurable conductivity could be observed. At room temperature $\tau = 10-20$ min for amorphous selenium and 3-5 hours for crystalline selenium. The conductivity rapidly increases after this time and a typical graph of conductivity versus time is shown in Figure 4. When the specimen was removed from the mercury-vapour atmosphere the resistance of the specimen increased by a factor of 2 - 3 and then remained constant. It was found that τ decreases with increasing temperature ($\tau = 10, 3.5$ and 1 min when $t = 36, 48$ and 58°C , respectively). The experiments indicate that the diffusion of mercury into selenium takes place both at room and higher temperatures. The rate of diffusion in amorphous selenium is greater than in crystalline selenium. The rate of diffusion in crystalline

Card 3/4

82336

S/139/60/000/03/018/045

EO32/E314

On the Diffusion of Mercury Atoms Into Selenium

selenium is considerably smaller than reported by Nasledov and Malyshev (Ref 2). The reason appears to be that at room temperature the conductivity does not appear for a number of months if the mercury atoms have to penetrate a depth of 1 mm. It is ^{further} suggested that the results reported in Ref 2 are erroneous. It is suggested that the lower limit for the diffusion coefficients of mercury in amorphous selenium is 10^{-11} cm²/sec and 10^{-13} cm²/sec in crystalline selenium. There are 4 figures and 5 references, 1 of which is German and 4 are Soviet.

ASSOCIATION: Khar'kovskiy politekhnicheskii institut imeni V.I. Lenina (Khar'kov Polytechnical Institute imeni V.I. Lenin)

SUBMITTED: June 22, 1959

Card 4/4

67983
SOV/81-59-12-41476

Translation from: Referativnyy zhurnal. Khimiya, 1959, No. 12, p 35 (USSR)

AUTHORS: Pastushuk, N.S., Litvinov, L.B., Reznik, M.V., Korsunskiy, M.I.

TITLE: The Negative Photoconductivity of Thin Layers of Selenium With Admixtures of Tellurium

PERIODICAL: Tr. Khar'kovsk. politekhn. in-ta, 1958, Vol 14, pp 111-115

ABSTRACT: The photoconductivity σ of thin layers of amorphous Se with an admixture of Te dusted in vacuum on glass backing at room temperature has been investigated. The darkness conductivity σ_0 of the studied layers is extremely low. It has been shown that the investigated samples have a noticeable negative photoconductivity observed at very weak electric fields (10^{-2} v/cm). The ratio of the dark current to the light current is 1.2-2. The time of establishing the stationary value of σ is equal to 15 - 20 minutes, and the time of relaxation of the "negative" σ_0 , determined from the moment of switching off the light to establishing the equilibrium value, is 12 - 16 hours. It has been pointed out that there is no theory which can explain the described phenomena.

V. Ostroborodova

Card 1/1

1ST AND 2ND ORDERS																										160 AND 1TH ORDERS																									
PROCESSING AND PROPERTY INDEX																																																			
The use of limestone gravel in road-building concrete. F. Ya. Reznik. <i>Strouel. Prom.</i> 1939, No. 7, 27-9; <i>Khim. ferat. Zhur.</i> 1939, No. 12, 80.—Replacement of granite gravel by limestone gravel lowered the bending strength of concrete 5-20% and the resistance to compression 20-35%. To avoid this decrease of strength and to preserve a const. consistency of concrete it is recommended to increase the amt. of cement by 20-45%. W. R. Henn																																																			
20																																																			
ASM. S. A. METALLURGICAL LITERATURE CLASSIFICATION																																																			
1939. DIVISION																																																			
1939. DIVISION																																																			

REZNIK, G. K., Candidate Biol Sci (diss) -- "Some comparative morphological and functional properties of the gastrointestinal tract of three representatives of the cod family". Moscow, 1959. 18 pp (Moscow State Order of Lenin and Order of Labor Red Banner U im M. V. Lomonosov), 110 copies (KL, No 24, 1959, 133)

GOTLIB, Ye.A., inzh.; REZNIK, G.V., inzh.

Modernizing the TS-17M tractor for welding in an atmosphere of carbon dioxide. Svar.proizv. no.5:34-35 My '62. (MIRA 15:12)

1. Trest "Yuzhteploenergomontazh."
(Electric welding--Equipment and supplies)
(Protective atmospheres)

REZNIK, H.

✓ Uptake of ¹⁴C-labelled lignin components in pine needles. H.
Reznik and R. Urban (*Planta*, 1956, 47, 1-15).—The production of
lignin precursors (coniferin, glucovanillin, glucosyringaldehyde)
and subsequent transformations is examined by a tracer technique.

A. G. POLLARD

REZNIK, G.K.

Microscopic structure of digestive organs in some gadoid fishes.
Nauch. dokl. vys. shkoly; biol. nauki no.2:46-52 '58. (MIRA 11:10)

1. Predstavlena kafedroy gidrogiologii Moskovskogo gosudarstvennogo
universiteta imeni M.V. Lomonosova.
(Codfish) (Digestive organs--Fishes)

REZNIK, G.K.

Histochemical study of the stomach and intestines of the Atlantic and White Sea cods (*Gadus morhua* L. and *Gadus morhua morhua* hie-malis Taliev) and the haddock (*Melanogrammus aeglephinus*) [with summary in English]. *Biul.MOIP.Otd.biol.* 63 no.3:19-23 My-Je '58.
(MIRA 12:3)

(DIGESTIVE ORGANS--FISHES) (GODFISH) (HADDOCK)

REZNIK, G.K.

Morphology of the alimentary tract in the codfishes *Gadus morhua* L.
and *Gadus aeglefinus* L. *Biul.MOIP.Otd.biol.* 63 no.2:174 *Mr-Ap '58*
(MIRA 11:7)

(DIGESTIVE ORGANS--FISHES)

GAFUROV, A.T.; AYEKHODZHAYEV, T.T.; ABDURASHITOV, K.; TURSUNOV, S.;
KOVAL'SKIY, N.I.; MULLOKANDOV, R.N.; REZNIK, G.F.; YAKUBOV, L.M.

Change of certain characteristics of cotton and kenaf under the
action of ultrasound. Prim. ul'traakust. k issl. veshch. no.14:
121-127 '61. (MIRA 14:12)

(Ambary hemp) (Cotton)
(Ultrasonic waves--Industrial applications)

VOYNOVA, P., inzh.; SOLNTSEVA, G., inzh.; GERLITSYN, Z.; REZNIK, I.

Removal of hides from refrigerated carcasses. Mias. ind. SSSR 28 no.6:
13-14 '57. (MIRA 11:1)

1. Vsesoyuznyy nauchno-issledovatel'skiy institut myasnoy promyshlennosti (for Voynova, Solntseva). 2. L'vovskiy myasokombinat (for Gerlitsyn, Reznik).

(Lvov--Slaughtering and slaughterhouses) (Hides and skins)